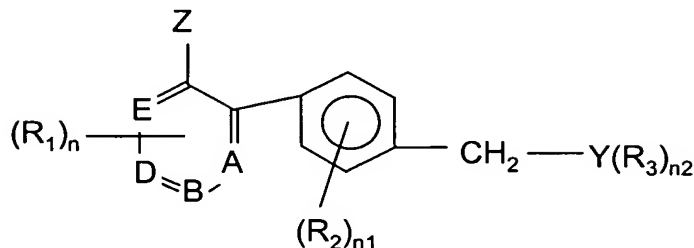
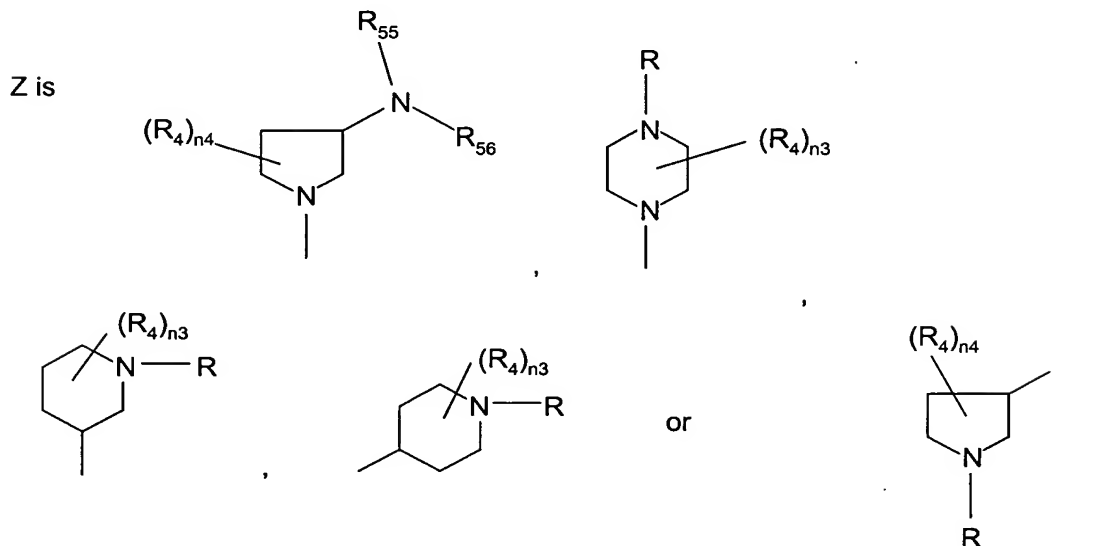


WHAT IS CLAIMED IS:

1. A compound of the formula



or pharmaceutically acceptable salts thereof wherein



5

A, B, D, E are independently CH or N, with at most two of A, B, D, and E being N;

each R, R₁, R₂, R₃ and R₄ are independently hydrogen loweralkyl which is unsubstituted or substituted with one to four substituents selected from halo, hydroxy, lower alkoxy, lower alkyl, cycloalkyl, cycloalkoxy, cycloalkyl lower alkyl or cycloalkyl lower alkoxy;

- 10 Y is a nitrogen containing heteroaryl having 5 to 14 ring atoms and containing at least one ring nitrogen atom and may optionally contain an additional ring heteroatom selected from the group consisting of nitrogen, oxygen and sulfur; said heteroaryl ring containing 5 to 13 ring carbon atoms and up to a total of 20 carbon atoms;

R₅₅ and R₅₆ are independently methyl or ethyl;

15

n is 0 to 4;

n₁ is 0-5;

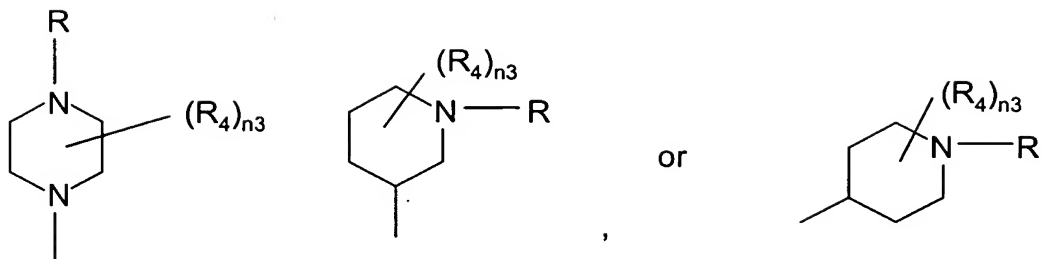
n₂ is 0-5;

n₃ is 0-4; and

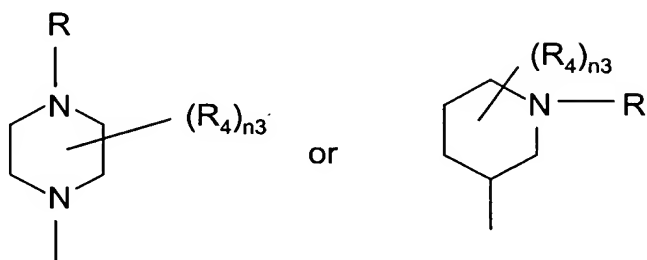
n₄ is 0-3.

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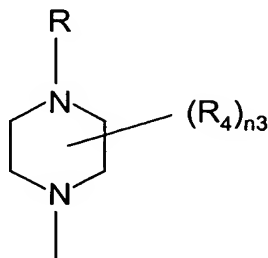
2. A compound according to Claim 1 wherein Z is



3. A compound according to Claim 1 wherein Z is



4. A compound according to Claim 1 wherein Z is



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5. A compound according to Claim 1 wherein at most one of E, D, B or A is nitrogen.

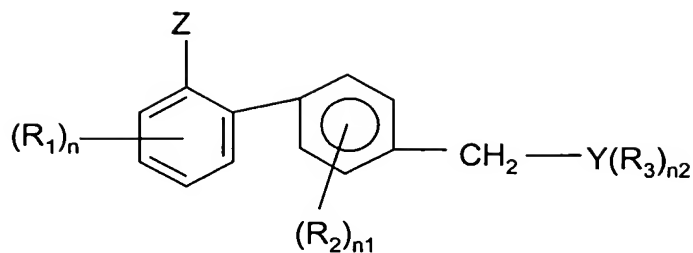
6. A compound according to Claim 1 wherein R, R₁, R₂, R₃ and R₄ are independently hydrogen or lower alkyl which is unsubstituted.

- 10 7. A compound according to Claim 1 wherein Y is a nitrogen containing heteroaryl containing at most three ring heteroatoms, wherein the ring heteroatoms are nitrogen.

8. A compound according to Claim 7 wherein Y contains one or two ring nitrogen atoms.

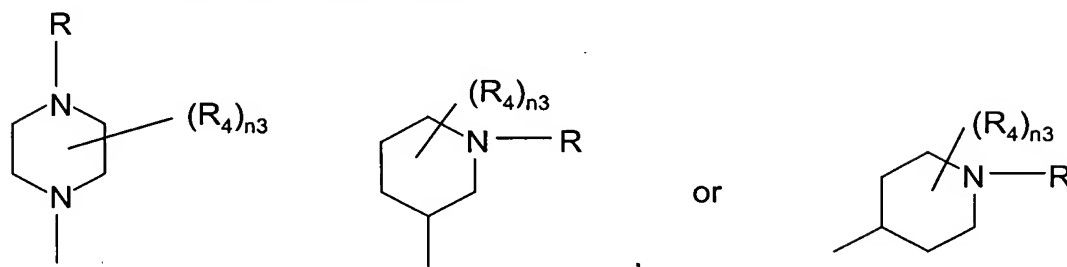
- 15 9. A compound according to Claim 1 wherein Y is pyrrolyl, pyrazolyl, triazolyl, imidazolyl, benzoimidazolyl, or indolyl.

10. A compound according to Claim 1 having the formula

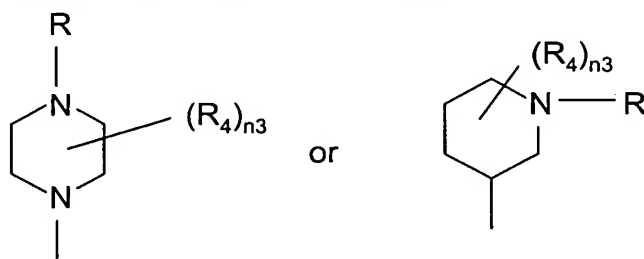


or a pharmaceutically acceptable salt thereof.

11. A compound according to Claim 10 wherein Z is



- 5 12. A compound according to Claim 10 wherein Z is



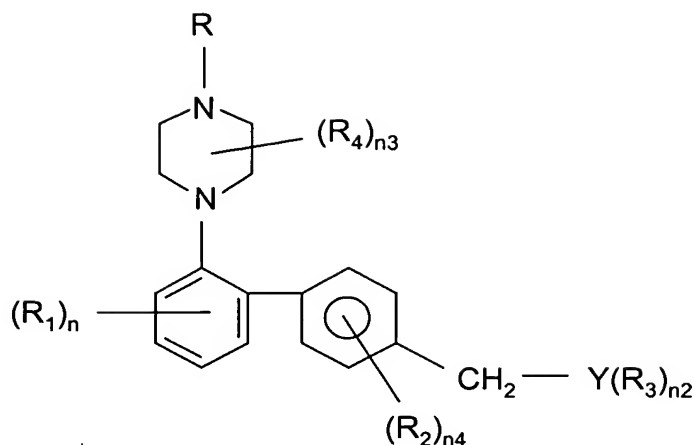
13. A compound according to Claim 10 wherein R, R₁, R₂, R₃ and R₄ are independently hydrogen or lower alkyl which is unsubstituted.

- 10 14. A compound according to Claim 10 wherein Y is a nitrogen containing heteroaryl containing at most three ring heteroatoms, wherein the ring heteroatoms are nitrogen.

- 15 15. A compound according to Claim 14 wherein Y contains one or two ring nitrogen atoms.

- 16 16. A compound according to Claim 10 wherein Y is pyrrolyl, pyrazolyl, triazolyl, imidazolyl, benzoimidazolyl or indolyl.

17. A compound according to Claim 1 of the formula



or pharmaceutically acceptable salts thereof.

18. A compound according to Claim 17 wherein n , n_1 , n_2 and n_3 are 1.
19. A compound according to Claim 17 wherein R is lower alkyl and R_1 , R_2 , R_3 and R_4 are hydrogen or unsubstituted lower alkyl.
20. A compound according to Claim 17 wherein Y is pyrrolyl, pyrazolyl, triazolyl, imidazolyl, benzoimidazolyl, or indolyl.
21. A compound according to Claim 1 wherein the compound is
 - 1-[2'-(4-Methyl-piperazine-1-yl)-biphenyl-4-ylmethyl]-1H-benzoimidazole;
 - 5-Chloro-1-[2'-(4-methyl-piperazin-1-yl)-biphenyl-4-ylmethyl]-1H-benzoimidazole;
 - 6-Chloro-1-[2'-(4-methyl-piperazin-1-yl)-biphenyl-4-ylmethyl]-1H-benzoimidazole;
 - 1-(4'-Imidazol-1-ylmethyl-biphenyl-2-yl)-4-methyl-piperazine;
 - 1-[2'-(4-Methyl-piperazin-1-yl)-biphenyl-4-ylmethyl]-1H-indole;
 - 5-Fluoro-1-(2'-piperazin-1-yl-biphenyl-4-ylmethyl)-1H-indole;
 - 5-Bromo-1-[2'-(4-methyl-piperazin-1-yl)-biphenyl-4-ylmethyl]-1H-indole;
 - 5-Methyl-1-[2'-(4-methyl-piperazin-1-yl)-biphenyl-4-ylmethyl]-1H-indole;
 - 1-Methyl-4-(4'-pyrrol-1-ylmethyl-biphenyl-2-yl)-piperazine;
 - 2-Methyl-1-[2'-(4-methyl-piperazin-1-yl)-biphenyl-4-ylmethyl]-1H-indole;
 - 1-[2'-(4-Methyl-piperazin-1-yl)-biphenyl-4-ylmethyl]-1H-pyrrolo[2,3-b]pyridine;
 - 2-Methyl-1-[2'-(4-methyl-piperazin-1-yl)-biphenyl-4-ylmethyl]-1H-benzoimidazole;
 - 1-Methyl-4-(4'-[1,2,4]triazol-1-ylmethyl-biphenyl-2-yl)-piperazine;
 - 3-(4'-[1,2,4]Triazol-1-ylmethyl-biphenyl-2-yl)-piperidine;
 - 3-(4'-(2-Ethyl-pyrrol-1-ylmethyl)-biphenyl-2-yl)-piperidine;
 - 3-(4'-Pyrazol-1-ylmethyl-biphenyl-2-yl)-piperidine;
 - 3-(4'-Pyrrol-1-ylmethyl-biphenyl-2-yl)-piperidine;
 - 1-(2'-Piperidin-3-yl-biphenyl-4-ylmethyl)-1H-indole;
 - 1-(4-[2-(4-Methyl-piperazin-1-yl)-pyridin-3-yl]-benzyl)-1H-benzoimidazole;
 - 5-Chloro-1-(4-[2-(4-methyl-piperazin-1-yl)-pyridin-3-yl]-benzyl)-1H-benzoimidazole;

6-Chloro-1-{4-[2-(4-methyl-piperazin-1-yl)-pyridin-3-yl]-benzyl}-1H-benzoimidazole;
1-[3-(4-Imidazol-1-ylmethyl-phenyl)-pyridin-2-yl]-4-methyl-piperazine;
1-{4-[2-(4-Methyl-piperazin-1-yl)-pyridin-3-yl]-benzyl}-1H-indole;
5-Fluoro-1-{4-[2-(4-methyl-piperazin-1-yl)-pyridin-3-yl]-benzyl}-1H-indole;
5 5-Bromo-1-{4-[2-(4-methyl-piperazin-1-yl)-pyridin-3-yl]-benzyl}-1H-indole;
5-Methyl-1-{4-[2-(4-methyl-piperazin-1-yl)-pyridin-3-yl]-benzyl}-1H-indole;
1-Methyl-4-[3-(4-pyrrol-1-ylmethyl-phenyl)-pyridin-2-yl]-piperazine;
2-Methyl-1-{4-[2-(4-methyl-piperazin-1-yl)-pyridin-3-yl]-benzyl}-1H-indole;
1-{4-[2-(4-Methyl-piperazin-1-yl)-pyridin-3-yl]-benzyl}-1H-pyrrolo[2,3-b]pyridine;
10 2-Methyl-1-{4-[2-(4-methyl-piperazin-1-yl)-pyridin-3-yl]-benzyl}-1H-benzoimidazole; or
1-Methyl-4-[3-(4-[1,2,4]triazol-1-ylmethyl-phenyl)-pyridin-2-yl]-piperazine or a
pharmaceutically acceptable salt thereof;

22. A pharmaceutical composition comprising a therapeutically effective amount
of a compound according to Claim 1 or a pharmaceutically acceptable salt thereof and a
15 pharmaceutically acceptable carrier therefor.

23. A method for treating a disorder or condition that can be treated by
modulating serotonergic neurotransmission in a mammal, comprising administering to a
mammal requiring such treatment a serotonin 7 receptor antagonizing or agonizing effective
amount of a compound according to Claim 1 or a pharmaceutically acceptable salt thereof.

20 24. A pharmaceutical composition for treating a condition or disorder that can be
treated by modulating serotonergic neurotransmission in a mammal, comprising:

- a) a pharmaceutically acceptable carrier;
- b) a first compound according to claim 1 or a pharmaceutically
acceptable salt thereof; and
- 25 c) a second compound selected from the group consisting of a 5HT
reuptake inhibitor, a 5HT1B receptor antagonist and a NK1 receptor antagonist and
pharmaceutically acceptable salts thereof;

wherein the total amount of the first compound or pharmaceutically acceptable salt
thereof, and second compound or the pharmaceutically acceptable salt thereof are such that
30 the composition is effective in treating such disorder or condition.

25. A method for treating a disorder or condition that can be treated by
modulating serotonergic neurotransmission in a mammal, comprising administering to a
mammal requiring such treatment:

- a) a compound according to Claim 1, or a pharmaceutically acceptable
35 salt thereof; and

b) a second compound selected from the group consisting of 5HT reuptake inhibitor, a 5HT1B receptor antagonist and an NK1 receptor antagonist and pharmaceutically acceptable salts thereof;

5 wherein the amounts of the first compound or pharmaceutically acceptable salt thereof or second compound or pharmaceutically acceptable salt thereof are such that the combination is effective in treating such disorder or condition.

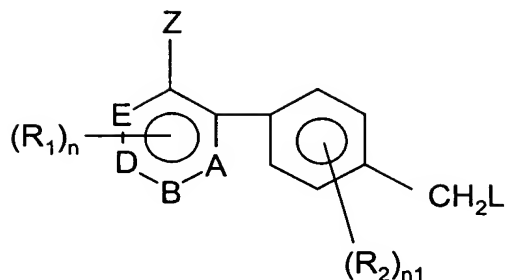
26. A method for treating a disorder or condition selected from depression, anxiety, avoidant personality disorder, premature ejaculation, eating disorders, migraine, premenstrual syndrome, premenstrual dysphoric disorder, seasonal affective disorder, bipolar
10 disorder, jet lag, sleep disorder, nocturnal enuresis, and restless leg syndrome in a mammal, comprising administering to a mammal in need of such treatment an effective amount of a compound according to Claim 1, or a pharmaceutically acceptable salt thereof, that is effective in treating such disorder or condition.

27. A method according to Claim 26 wherein the sleep disorder is circadian sleep
15 rhythms disorder, sleep deprivation, REM sleep disorder, hypersomnia, parasomnia, sleep-wake cycle disorder, a sleep disorder associated with blindness, a sleep disorder associated with obesity, narcolepsy, or a sleep disorder associated with shift work or irregular work schedules.

28. A method of treating a disorder or condition selected from depression, anxiety, avoidant personality disorder, premature ejaculation, eating disorders, migraine, premenstrual syndrome, premenstrual dysphoric disorder, seasonal affective disorder, bipolar
20 disorder, jet lag, sleep disorder, nocturnal enuresis, and restlessleg syndrome in a mammal, comprising administering to a mammal requiring such treatment: a first compound according to Claim 1 or pharmaceutically acceptable salt thereof and a second compound selected from the group consisting of a serotonin reuptake inhibitor, a NK1 receptor antagonist and a 5HT1B
25 receptor antagonist and pharmaceutically acceptable salts thereof; wherein the first compound or its pharmaceutically acceptable salt and second compound or its pharmaceutically acceptable salt are present in amounts that render the combination effective in treating such disorder or condition.

29. A method according to Claim 28 wherein the sleep disorder is circadian sleep
30 rhythms disorder, sleep deprivation, REM sleep disorder; hypersomnia, parasomnia, a sleep-wake cycle disorder, a sleep disorder associated with blindness, a sleep disorder associated with obesity, narcolepsy, or a sleep disorder associated with shift work or irregular work schedules.

35 30. A compound of the formula



- A, B, D, E are independently CH or N, with at most two of A, B, D, and E being N;
 each R, R₁, R₂, and R₃ are independently hydrogen loweralkyl which is unsubstituted
 or substituted with one to four substituents selected from halo, hydroxy, lower alkoxy, lower
 5 alkyl, cycloalkyl, cycloalkoxy, cycloalkyl lower alkyl or cycloalkyl lower alkoxy;

L is a leaving group or OH;

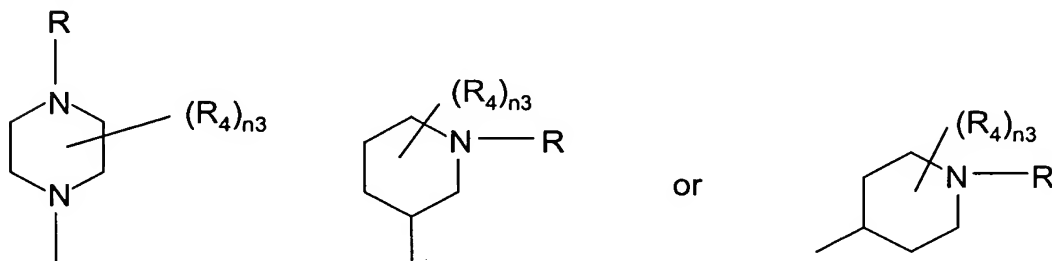
n is 0 to 4;

n₁ is 0-5;

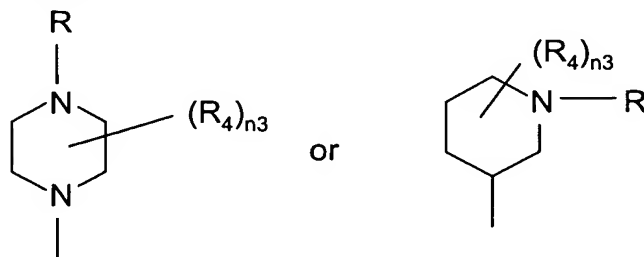
n₃ is 0-4; and

10 n₄ is 0-3.

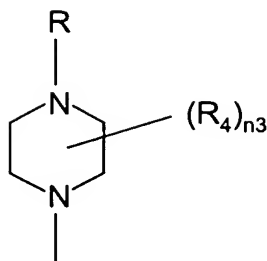
31. A compound according to Claim 30 wherein Z is



32. A compound according to Claim 30 wherein Z is



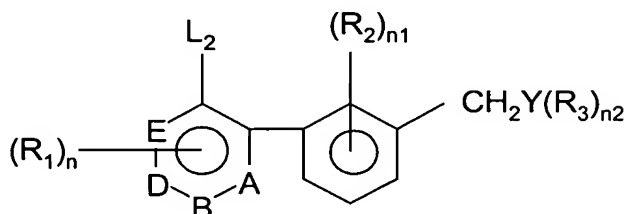
- 15 33. A compound according to Claim 30 wherein Z is



34. A compound according to Claim 30 wherein at most one of E, D, B or A is nitrogen.

35. A compound according to Claim 30 wherein R, R₁, R₂, R₃ and R₄ are independently hydrogen or lower alkyl which is unsubstituted.

36. A compound of the formula



A, B, D, E are independently CH or N, with at most two of A, B, D, and E being N;

each R₁, R₂, and R₃ are independently hydrogen loweralkyl which is unsubstituted or substituted with one to four substituents selected from halo, hydroxy, lower alkoxy, lower alkyl, cycloalkyl, cycloalkoxy, cycloalkyl lower alkyl or cycloalkyl lower alkoxy;

Y is a nitrogen containing heteroaryl having 5 to 14 ring atoms and containing at least one ring nitrogen atom and may optionally contain an additional ring heteroatom selected from the group consisting of nitrogen, oxygen and sulfur; said heteroaryl ring containing 5 to 13 ring carbon atoms and up to a total of 20 carbon atoms;

L₂ is OH;

n is 0 to 4;

n₁ is 0-5; and

n₂ is 0-5.

37. A compound according to Claim 36 wherein at most one of E, D, B or A is nitrogen.

38. A compound according to Claim 36 wherein Y is a nitrogen containing heteroaryl containing at most three ring heteroatoms, wherein the ring heteroatoms are nitrogen.

39. A compound according to Claim 38 wherein Y is a nitrogen containing heteroaryl containing one or two ring nitrogen atoms.

40. A compound according to Claim 36 wherein Y is pyrrolyl, pyrazolyl, triazolyl, imidazolyl, benzoimidazolyl or indolyl.